

(19) World Intellectual Property
Organization
International Bureau



(43) International Publication Date
11 March 2004 (11.03.2004)

PCT

(10) International Publication Number
WO 2004/019765 A3

(51) International Patent Classification⁷: A61B 17/08

(21) International Application Number:
PCT/US2003/027296

(22) International Filing Date: 29 August 2003 (29.08.2003)

(25) Filing Language: English

(26) Publication Language: English

(30) Priority Data:
10/232,505 30 August 2002 (30.08.2002) US
10/366,818 13 February 2003 (13.02.2003) US

(71) Applicant (for all designated States except US): SATI-
ETY, INC. [US/US]; 2470 Embarcadero Way, Palo Alto,
CA 94303-3313 (US).

(72) Inventors; and

(75) Inventors/Applicants (for US only): GANNOE, James

[US/US]; 2877 Bleinheim Avenue, Redwood City, CA
94063 (US). GERBI, Craig [US/US]; 515 Villa Street,
Mountain View, CA 94041 (US).

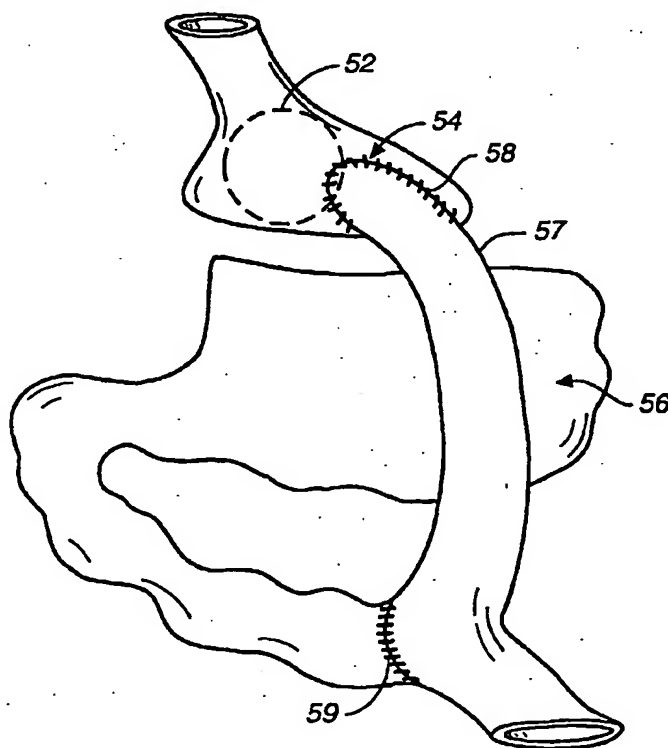
(74) Agents: KING, Cameron, A. et al.; Morrison & Foerster
LLP, 425 Market Street, San Francisco, CA 94105-2482
(US).

(81) Designated States (national): AE, AG, AL, AM, AT, AU,
AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU,
CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH,
GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC,
LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW,
MX, MZ, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC,
SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA,
UG, US, UZ, VC, VN, YU, ZA, ZM, ZW.

(84) Designated States (regional): ARIPO patent (GH, GM,
KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW),
Eurasian patent (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM),
European patent (AT, BE, BG, CH, CY, CZ, DE, DK, EE,
ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO,

[Continued on next page]

(54) Title: METHODS AND DEVICES FOR MAINTAINING A SPACE-OCCUPYING DEVICE WITHIN A STOMACH



(57) Abstract: Methods and devices for maintaining a space-occupying device in a fixed relationship relative to a patient's stomach by manipulation of the stomach. In one variation, two or more regions of the stomach wall are brought into approximation with one another and secured together in a manner that secures a space-occupying device (2) within the stomach of the patient. In another variation, two or more regions of the stomach wall are wrapped around a space-occupying device (2) to maintain the position of the space-occupying member (2) relative to the stomach wall. In another variation, a system having a space-occupying member (2) against the inner wall of the stomach are provided. In a further variation, a pouch is created within the stomach that receives and retains a space-occupying device (2).

WO 2004/019765 A3

A27



SE, SI, SK, TR), OAPI patent (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.

Published:

- *with international search report*
- *before the expiration of the time limit for amending the claims and to be republished in the event of receipt of amendments*

(88) Date of publication of the international search report:

29 July 2004

INTERNATIONAL SEARCH REPORT

International application No.

PCT/US03/27296

A. CLASSIFICATION OF SUBJECT MATTER

IPC(7) : A61B 17/08

US CL : 606/153

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

U.S. : 606/153, 192; 600/207; 128/898

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)
Please See Continuation Sheet

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X — Y	US 4,416,267 A (GARREN et al.) 22 November 1983 (22.11.1983), See entire document.	1,3,4,8-12,14 2,5,6,15
X — Y	US 4,133,315 A (BERMAN et al.) 09 January 1979 (09.01.1979), See entire document.	1,9-11,14 15
X — Y	US 5,129,915 A (CANTENYS) 14 July 1992 (14.07.1992), See entire document.	1,9,10 15

☐ Further documents are listed in the continuation of Box C.

☐ See patent family annex.

* Special categories of cited documents:

"A" document defining the general state of the art which is not considered to be of particular relevance

"E" earlier application or patent published on or after the international filing date

"L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)

"O" document referring to an oral disclosure, use, exhibition or other means

"P" document published prior to the international filing date but later than the priority date claimed

"T" later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention

"X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone

"Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art

"&" document member of the same patent family

Date of the actual completion of the international search

17 May 2004 (17.05.2004)

Date of mailing of the international search report

28 MAY 2004

Name and mailing address of the ISA/US

Mail Stop PCT, Attn: ISA/US
Commissioner for Patents
P.O. Box 1450
Alexandria, Virginia 22313-1450

Facsimile No. (703) 305-3230

Authorized officer

Julian W. Woo

Telephone No. 703-308-0421

INTERNATIONAL SEARCH REPORT

PCT/US03/27296

Continuation of Item 4 of the first sheet:
The existing title is too long under PCT Rule 4.3.

NEW TITLE

Methods and Devices for Maintaining a Space-Occupying Device Within a Stomach

Continuation of B. FIELDS SEARCHED Item 3:

EAST BRS

search terms: balloon, stomach, toroid, pouch